

CLAIMS

1. A screening tool for an agent for promoting insulin production and/or an agent for increasing insulin content, wherein the tool is a polypeptide comprising (1) the amino acid sequence of SEQ ID NO: 2 or 4 or (2) an amino acid sequence in which 1 to 15 amino acids are deleted, substituted, and/or inserted in the amino acid sequence of SEQ ID NO: 2 or 4, and exhibiting an activity of promoting insulin production by activation.
2. A screening tool for an agent for promoting insulin production and/or an agent for increasing insulin content, wherein the tool is a polypeptide comprising the amino acid sequence of SEQ ID NO: 2 or 4 and exhibiting an activity of promoting insulin production by activation.
3. A screening tool for an agent for promoting insulin production and/or an agent for increasing insulin content, wherein the tool is a polypeptide consisting of an amino acid sequence having an 80% or more homology with that of SEQ ID NO: 2 or 4, and exhibiting an activity of promoting insulin production by activation.
4. A screening tool for an agent for promoting insulin production and/or an agent for increasing insulin content, wherein the tool is a polypeptide consisting of the amino acid sequence of SEQ ID NO: 2 or 4.
5. A screening tool for an agent for promoting insulin production and/or an agent for increasing insulin content, wherein the tool is a cell expressing the polypeptide according to any one of claims 1 to 4.
6. Use of the polypeptide according to any one of claims 1 to 4 or the cell according to claim 5 for screening an agent for promoting insulin production and/or an agent for increasing insulin content.
7. A method for screening an agent for promoting insulin

production and/or an agent for increasing insulin content, comprising the steps of:

bringing the cell according to claim 5 or a cell membrane thereof into contact with a substance to be tested, and analyzing whether or not the polypeptide according to any one of claims 1 to 4 is activated.

8. A process for manufacturing a pharmaceutical composition for promoting insulin production and/or increasing insulin content, comprising the steps of:

bringing the cell according to claim 5 or a cell membrane thereof into contact with a substance to be tested, analyzing whether or not the polypeptide according to any one of claims 1 to 4 is activated, and

preparing a medicament containing the substance.

9. An agent for promoting insulin production and/or an agent for increasing insulin content, comprising as an active ingredient a substance activating the polypeptide according to any one of claims 1 to 4.

10. A method for promoting insulin production and/or increasing insulin content, comprising administering to a subject a substance activating the polypeptide according to any one of claims 1 to 4.

11. Use of a substance activating the polypeptide according to any one of claims 1 to 4, in the manufacture of a pharmaceutical composition for promoting insulin production and/or increasing insulin content.